

PDF technical sheet

68/600L1



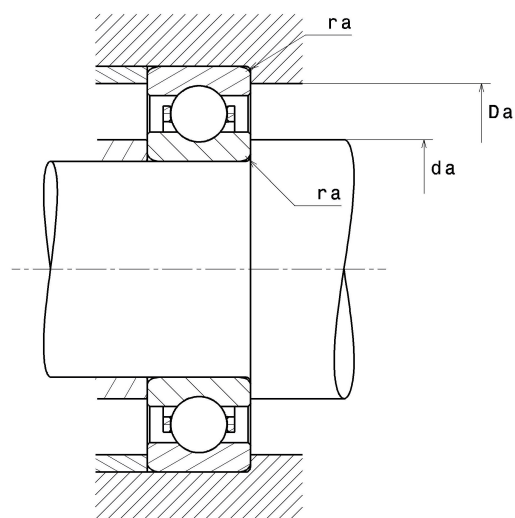
Single row deep groove ball bearings

Deep groove ball bearing, radial contact, machined cage, open

Product definition	
d	23.6220 "
D	28.7402 "
B	2.3622 "
rs min	0.1181 "
Radial clearance class	CN
Mass	182.37 oz
Brand	NTN



Product performance	
Dynamic load, C	375 kN
Static load, C0	705 kN
Fatigue limit load, Cu	12.40 kN
f0	16
Nlim (oil)	780 RPM
Nlim (grease)	660 RPM
Min operating temperature, Tmin	-4 °C
Max operating temperature, Tmax	248 °C
Characteristic cage frequency, FTF	0.47 Hz
Characteristic rolling element frequency, BSF	16.05 Hz
Characteristic outer ring frequency, BPF0	12.19 Hz
Characteristic inner ring frequency, BPFI	13.81 Hz



Abutment dimensions

da min	24.1339 "
Da max	28.2283 "
ra max	0.0984 "

Calculation factors

Equivalent dynamic radial load

$$P = X.F_r + Y.F_a$$

$\frac{f_0 F_a}{C_0}$	e	$F_a / F_r \leq e$		$F_a / F_r > e$	
		X	Y	X	Y
0.172	0.19	1	0	0.56	2.3
0.345	0.22				1.99
0.689	0.26				1.71
1.03	0.28				1.55
1.38	0.3				1.45
2.07	0.34				1.31
3.45	0.38				1.15
5.17	0.42				1.04
6.89	0.44				1

Equivalent static radial load

$$P_0 = X_0.F_r + Y_0.F_a$$

X_0	Y_0
0.6	0.5

For single or DT bearing arrangement :

If $P_0 < F_r$, then use $P_0 = F_r$